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| APPLICATION NO. | FILING DATE | FIRST NAMED INVENTOR | ATTORNEY DOCKET NO. | CONFIRMATION NO. |
|-----------------------------|-----------------------------|----------------------|---------------------|------------------|
| 10/541,837 | 07/12/2005 | Uno Henningsson | P16589 | 6125 |
| 27045 ERICSSON IN | 7590 05/02/200 C. | EXAMINER | | |
| 6300 LEGACY M/S EVR 1-C- | - · - | BOES, TERENCE | | |
| PLANO, TX 75024 | | | ART UNIT | PAPER NUMBER |
| ŕ | | | 3682 | |
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| | | | MAIL DATE | DELIVERY MODE |
| | | | 05/02/2007 | PAPER |

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

| | | Application No. | Applicant(s) | | | |
|---|---|---|---|--|--|--|
| Office Action Summary | | 10/541,837 | HENNINGSSON ET AL. | | | |
| | | Examiner | Art Unit | | | |
| | | Terence Boes | 3682 | | | |
| | The MAILING DATE of this communication app | ears on the cover sheet with the | he correspondence address | | | |
| Period fo | • • | / IO OET TO EVENE - MONT | T. ((0), 0.5 T. ((5), 5.) | | | |
| WHI(- Exte after - If NO - Failu Any | ORTENED STATUTORY PERIOD FOR REPLY CHEVER IS LONGER, FROM THE MAILING DAINS on sof time may be available under the provisions of 37 CFR 1.13 SIX (6) MONTHS from the mailing date of this communication. Operiod for reply is specified above, the maximum statutory period vare to reply within the set or extended period for reply will, by statute, reply received by the Office later than three months after the mailing led patent term adjustment. See 37 CFR 1.704(b). | ATE OF THIS COMMUNICAT 36(a). In no event, however, may a reply built apply and will expire SIX (6) MONTHS, cause the application to become ABAND | TON. De timely filed from the mailing date of this communication. ONED (35 U.S.C. § 133). | | | |
| Status | | | | | | |
| 1)⊠ | Responsive to communication(s) filed on 29 M | arch 2007. | | | | |
| 2a) <u></u> □ | This action is FINAL . 2b)⊠ This action is non-final. | | | | | |
| 3) | Since this application is in condition for allowance except for formal matters, prosecution as to the merits is | | | | | |
| | closed in accordance with the practice under E | x parte Quayle, 1935 C.D. 11 | , 453 O.G. 213. | | | |
| Disposit | ion of Claims | | | | | |
| 4) 🛛 | Claim(s) 1-11 and 13-23 is/are pending in the | application. | | | | |
| , | 4a) Of the above claim(s) is/are withdrawn from consideration. | | | | | |
| 5) | Claim(s) is/are allowed. | | | | | |
| 6)⊠ | Claim(s) 1-11 and 13-23 is/are rejected. | | | | | |
| , | Claim(s) is/are objected to. | | | | | |
| 8) | Claim(s) are subject to restriction and/o | r election requirement. | | | | |
| Applicat | ion Papers | | | | | |
| 9)[| The specification is objected to by the Examine | r. | | | | |
| 10) | The drawing(s) filed on is/are: a) acce | epted or b) objected to by t | he Examiner. | | | |
| | Applicant may not request that any objection to the | drawing(s) be held in abeyance. | See 37 CFR 1.85(a). | | | |
| | Replacement drawing sheet(s) including the correct | - · · · | | | | |
| 11) | The oath or declaration is objected to by the Ex | aminer. Note the attached Of | fice Action or form PTO-152. | | | |
| Priority (| under 35 U.S.C. § 119 | · | · | | | |
| , | Acknowledgment is made of a claim for foreign ☐ All b) ☐ Some * c) ☐ None of: | priority under 35 U.S.C. § 11 | 9(a)-(d) or (f). | | | |
| | 1. Certified copies of the priority documents | s have been received. | | | | |
| | 2. Certified copies of the priority documents | , , | - , , , , , , , , , , , , , , , , , , , | | | |
| | 3. Copies of the certified copies of the prior | • | eived in this National Stage | | | |
| * (| application from the International Bureau | | -id | | | |
| | See the attached detailed Office action for a list | or the certified copies not fect | BIVEU. | | | |
| Attachmer | | | | | | |
| | ce of References Cited (PTO-892) ce of Draftsperson's Patent Drawing Review (PTO-948) | 4) Interview Summ Paper No(s)/Ma | | | | |
| 3) Information Disclosure Statement(s) (PTO/SB/08) Paper No(s)/Mail Date 5) Notice of Informal Patent Application 6) Other: | | | | | | |

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DETAILED ACTION

Request for Continued Examination

1. The request filed on 03/29/2007 for a Continued Examination (RCE) is accepted and a continued prosecution application has been established. An action on the RCE follows.

Claim Rejections - 35 USC § 112

The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

2. Claims 2-8, 10, 14-20, and 22 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

The recitation "consists of" appearing in claims 2 and 14 renders the claims indefinite. The transitional phrase "consisting of" excludes any element, step, or ingredient not specified in the claim [MPEP 2111.03]. Is applicant intending the claim to exclude any element, step, or ingredient not specified in the claim? The examiner notes claim 2 also recites "A screw arrangement comprising a cavity". How can the screw arrangement consist of a first part and a second part, excluding any other element, and also including a cavity?

The recitation "...a cross section that minimizes the contacting surface...", appearing in claims 10 and 22, renders the claims indefinite. The term "minimizes" is a relative term which renders the claim indefinite. The term "minimizes" is not defined by the claim, the specification does not provide a standard for ascertaining the requisite

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degree, and one of ordinary skill in the art would not be reasonably apprised of the scope of the invention.

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

- (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.
- 3. Claims 1-11, as best understood, are rejected under 35 U.S.C. 103(a) as being unpatentable over Morales US 4,954,032 in view of Newell US 3,169,407.

Morales discloses:

- a cavity for insertion of a threaded axle (9) along which the screw arrangement is movably arranged,
- a first resilient part (25) to eliminate an axial allowance.
- a second resilient part (upper instance of 21) to eliminate a radial allowance,
- whereby the screw arrangement consists of a first part (3) and a second part (2) that are connectable to each other.
- whereby the first part can be inserted into the second part (see figures 4 and 5).
- whereby the first resilient part comprises a separate spring (25 is a spring).

 whereby the first resilient part comprises an integrated part of the first part of the screw arrangement (3 and 25 are integrated in that they function together, see figures 4 and 5).

- whereby the second resilient part comprises at least one resilient tongue
 (21 is a resilient tongue) that is arranged in parallel to the screw
 arrangement axis for insertion into corresponding grooves (upper instance of 28) of the second part of the screw arrangement.
- whereby an end of the resilient tongue is equipped with a bulge (upper instance of 22) to secure a firm connection of the first and second part of the screw arrangement.
- whereby the first screw arrangement part comprises one or more convex protrusions (lower instance of 22) and the second screw part comprises corresponding grooves (28) for insertion of the first part of the screw arrangement into the second part of the screw arrangement.
- the screw arrangement comprising a threaded means for fastening of a tuner object (8 is capable of fastening a tuner object).

Morales discloses all of the claimed subject matter as described above. Morales does not disclose a screw arrangement cavity at its inside being equipped with semispheres that follow the turn of threads of a threaded axle

Newell teaches a screw arrangement cavity at its inside being equipped with six semi-spheres (27) that follow the turn of threads of a threaded axle for the purpose of reducing friction (C1/L10-15).

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It would have been obvious to one having ordinary skill in the art at the time of the invention to modify the teachings of Morales and provide a screw arrangement cavity at its inside being equipped with six semi-spheres that follow the turn of threads of a threaded axle, as taught by Newell, for the purpose of reducing friction.

4. Claims 13-23, as best understood, are rejected under 35 U.S.C. 103(a) as being unpatentable over Morales US 4,954,032 in view of Newell US 3,169,407, and further in view of Schmid et al. US 5,039,966.

Morales discloses:

- a first resilient part (25) to eliminate an axial allowance
- a second resilient part (upper instance of 21) to eliminate a radial allowance,
- whereby the screw arrangement consists of a first part (3) and a second
 part (2) that are connectable to each other.
- whereby the first part can be inserted into the second part (see figures 4 and 5).
- whereby the first resilient part comprises a separate spring (25 is a spring).
- whereby the first resilient part comprises an integrated part of the first part
 of the screw arrangement (3 and 25 are integrated in that they function
 together, see figures 4 and 5).
- whereby the second resilient part comprises at least one resilient tongue
 (21 is a resilient tongue) that is arranged in parallel to the screw

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arrangement axis for insertion into corresponding grooves (upper instance of 28) of the second part of the screw arrangement.

- whereby an end of the resilient tongue is equipped with a bulge (upper instance of 22) to secure a firm connection of the first and second part of the screw arrangement.
- whereby the first screw arrangement part comprises one or more convex protrusions (lower instance of 22) and the second screw part comprises corresponding grooves (28) for insertion of the first part of the screw arrangement into the second part of the screw arrangement.
- the screw arrangement comprising a threaded means for fastening of a tuner object (8 is capable of fastening a tuner object).

Morales discloses all of the claimed subject matter as described above. Morales does not disclose a screw arrangement cavity at its inside being equipped with semispheres that follow the turn of threads of a threaded axle

Newell teaches a screw arrangement cavity at its inside being equipped with six semi-spheres (27) that follow the turn of threads of a threaded axle for the purpose of reducing friction (C1/L10-15).

It would have been obvious to one having ordinary skill in the art at the time of the invention to modify the teachings of Morales and provide a screw arrangement cavity at its inside being equipped with six semi-spheres that follow the turn of threads of a threaded axle, as taught by Newell, for the purpose of reducing friction.

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Morales in view of Newell disclose all of the claimed subject matter as described above. Morales in view of Newell does not disclose a cavity for insertion of a threaded axle inside of which the screw arrangement is movably arranged,

Schmid et al. teaches a cavity (20) for insertion of a threaded axle inside of which the screw arrangement is movably arranged, for the purpose of using a screw arrangement to change or tune a frequency (see abstract)

It would have been obvious to one having ordinary skill in the art at the time of the invention to use the screw arrrangement of Morales in view of Newell within a cavity for insertion of a threaded axle inside of which a screw arrangement is movably arranged, as taught by Schmid et al., for the purpose of using a screw arrangement to change or tune a frequency.

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Terence Boes whose telephone number is (571) 272-4898. The examiner can normally be reached on Monday - Friday 9:00 AM - 4:00 PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Richard Ridley can be reached on (571) 272-6917. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

TB 4/24/07

> RICHARD RIDLEY SUPERVISORY PATENT EXAMINER